



# Proposal Paper Outline



## I. Overview

- A. The Situation [guidelines, examples]
- B. Coalition / Joint / Interagency Operational Problem [guidelines, example]
- C. Desired Capability(ies) [guidelines, example]
- D. Top Level Capabilities and Metrics As Applied to Joint Functional Capability Area [guidelines, example]
- E. Solution Trade-Off Analysis
  - 1. Key Assumptions [guidelines, example]
  - 2. Alternatives Identification and Comparison [guidelines, example]
  - 3. Conclusions and Recommendations [guidelines, example]
- F. Capabilities Solution [guidelines, example]
- G. Overall Demonstration Strategy [guidelines, example]

**Supports ID and  
MTP  
Development**

## II. Operational Management

- A. OV-1 Architecture [guidelines, example]
- B. Top Level CONEMP or CONOP [guidelines, example]
- C. Critical Operational Issues [guidelines, examples]
- D. Coalition / Joint / Interagency Operational Utility Assessment Strategy [guidelines, example]
- E. Operational Demonstration Approach [guidelines, example]
- F. Top Level Demonstration Scenarios [guidelines, example]

## III. Technical Management

- A. System View-1 (SV-1) [guidelines, example]
- B. Technical Demonstration and Programmatic Approach [guidelines, example]
- C. Core Technologies [guidelines, example]
- D. Affordability for Transition [guidelines, example]
- E. Interoperability and Integration [guidelines, example]
- F. Training [guidelines, example]
- G. Security, Information Assurance and Safety [guidelines, example]

Narrative Text  
Figures &  
Illustrations  
Tables & Charts  
Schedules  
Spreadsheets



# Proposal Paper Outline (cont'd)



## IV. Transition Management

- A. Overall Transition Strategy [guidelines, examples]
- B. Description of Products / Deliverables [guidelines, example]
- C. Follow-on Development, Production, Fielding and Sustainment [guidelines, example]
- D. Interim Capability Through Extended Use [if implemented] [guidelines, example]

Supports ID and  
MTP  
Development

## V. Networks / Equipment / Facilities / Ranges / Sites [guidelines, example]

## VI. Organizational and Programmatic and Approach

- A. Organizational Structure, Roles and Responsibilities [guidelines, example]
- B. Programmatic
  - 1. Schedule [guidelines, example]
  - 2. Supporting Programs [guidelines, example]
  - 3. Cost Plan [by task and by year] [guidelines, example]
  - 4. Funding [by source and by year] [guidelines, example]

## VII. Acquisition and Contracting Strategy [guidelines, example]

## VIII. JCTD Risk Management and Mitigation Approach [guidelines, example]

## IX. Summary / Payoffs [guidelines, example]

## X. Acronyms [guidelines, example]

## XI. Glossary [guidelines, example]

## XII. Related Documents [guidelines, example]

Narrative Text  
Figures &  
Illustrations  
Tables & Charts  
Schedules  
Spreadsheets



# Section Title: I. Overview

A1857-J-07

- **Section Sub-Title: A. The Situation**

- **Guidelines:**

- Content: Describe and highlight current overarching operational challenges and situation as the root conditions for defining a Coalition / Joint / interagency Operation Problem

- Format:

	PowerPoint	Word
Section Type	Narrative / Bullet List / Illustrations	
Section Length	½ Paragraph Maximum	



# Example: I. Overview

## A. The Situation



- **In Africa, threats in the maritime domain vary widely in scope:**
  - Terrorism
  - Smuggling, narco-trafficking, oil theft and piracy
  - Fisheries violations
  - Environmental degradation
- **African nations are unable to respond to maritime security threats:**
  - Recent piracy incidents off of Somalia highlight threat
  - AU recently expressed desire to establish continent-wide maritime security action group





# Section Title: I. Overview

A1857-J-08

- **Section Sub-Title: B. Coalition / Joint / Interagency Operational Problem**
- **Guidelines:**
  - Content: Describe operational deficiency(s) that limits or prevents acceptable performance / mission success

– Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	½ Page



# Example: I. Overview

## B. Coalition / Joint / Interagency Operational Problem

*Unable to identify, prioritize, characterize and share global maritime threats in a timely manner throughout multiple levels of security and between interagency partners.*

- Insufficient ability to achieve and maintain maritime domain awareness (intelligence, people, cargo, vessel [cooperative and uncooperative]) on a global basis (to include commercially navigable waterways)
- Insufficient ability to automatically generate, update and rapidly disseminate high-quality ship tracks and respective metadata (people, cargo, vessel) that are necessary to determine threat detection at the SCI level on a 24/7 basis on SCI networks
- Insufficient ability to aggregate maritime data (tracks) from multiple intelligence sources at multiple levels of security to determine ship movement, past history and current location
- Inability to automatically ingest, fuse and report “SuperTracks” (tracks + cargo + people + metadata [associated data]) to warfighters and analysts at the SCI level
- Inability to generate and display automated rule-based maritime alert notifications based on a variety of predetermined anomalous activity indicators established from SCI Intelligence Community channels



# Section Title: I. Overview

A1857-J-09

- **Section Sub-Title: C. Desired Capability(ies)**

- **Guidelines:**

- Content: Describe capabilities and tasks to be assessed throughout the JCTD (month/year) that will resolve the operational problem:
  - Describe in terms of desired outcomes
  - Descriptions should contain required characteristics (tasks / attributes) with appropriate parameters and metrics (e.g., timely, relevant, accurate, etc.) to be overcome and supported

- Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	½ Page





# Example: I. Overview

## C. Desired Capability(ies)

- **Global, persistent, 24/7/365, pre-sail through arrival, maritime cooperative and non-cooperative vessel tracking awareness information (people, vessel, cargo) that flows between and is disseminated to appropriate intelligence analysts / joint warfighters / senior decision makers / interagency offices within the SCI community, with the following data manipulation capabilities:**
  - Identify, query and filter vessels of interest automatically based on user-defined criteria
  - Ensure reported track updates of the most recent location are based on the refresh rate of the source
  - Conduct advanced queries that can inference across multiple data sources at the SCI level
  - Ability to access and disseminate appropriate data to and from SCI, Secret and unclassified networks. (Secret and SBU dissemination done through other channels)
  - Display and overlay multiple geospatial data sources (e.g. mapping data, port imagery, tracks, networks of illicit behavior monitored by IC or LEA channels)
- **Automated, rule-based maritime-related activity (people, vessel, cargo) detection alerting and associated information at the SCI level (with new sources not available at lower security levels) to appropriate analysts, warfighters, senior decision makers and interagency personnel/offices:**
  - Generate and send alerts based on user-defined criteria
  - Define patterns of normal behavior based on understanding of global supply chains
  - Define alerting criteria based on models of abnormal behavior (e.g., loitering off a high-interest area)
- **User-Defined Awareness Picture (UDAP)**
  - Tailorable for each unit (user-defined parameters/filters)
- **SCI Subscription Service**
- **Interoperable with currently existing data sources and systems**
- **CONOP and TTP compatible with developing greater MDA CONOP and TTP**





# Section Title: I. Overview

A1857-J-10

- **Section Sub-Title: D. Top Level Capabilities & Metrics as applied to Joint Functional Capability Area**
- **Guidelines:**
  - Content: Define Capabilities and Metrics Table:
    - Driven and identified by desired capabilities:
      - Tasks / attributes for each capability
      - Measures and metrics per task / attribute
      - Baseline values prior to start of JCTD
      - Targeted threshold values for successful completion of experiment
    - Values defined in quantitative and qualitative terms

- Format:

	PowerPoint	Word
Section Type	Table / Chart	
Section Length	1 Page	



# Example: I. Overview

## D. Top Level Capabilities & Metrics as applied to Joint Functional Capability Area

A1857-J-11

Capability (From "Desired Capabilities")	Task / Attribute	Measure	Metric	Baseline (Today's Capability)	Targeted Threshold Values (FY08)	Objective Values
Global, persistent, 24/7/365 maritime cooperative and non-cooperative vessel awareness information	Identify, query and filter based on user-defined criteria	Query and filter capability across multiple MDA data types	Query and filter fidelity	Limited capability to identified ships only	Automated query and filter of MDA data within 1-2 hours of data receipt	Automated query and filter of MDA data within minutes of data receipt
	Track updates	Collector refresh rate and data latency	Timeliness	Manual data correlation	1 hour average (varies by INT)	15 minutes
	Track quantity	Number of valid tracks within the system that contribute to vessel awareness	Number of unique tracks	Manual: 200-300 VOIs Automatic: 1200	20,000 automated and unique tracks	50,000 automated and unique tracks
	Track quality	Number of valid and verified positions that form a track	Variance between actual and reported tracks. (and/or) confidence of the positions from the track composition	Manual: Very high ~ (approx) 99.5% automatic: confidence is high, but ID varies	Unique track that contains vessel, or people, or cargo awareness information	Unique track specifically identifies the vessel, cargo and people
	Advanced queries	Ability to provide sophisticated query capability to multiple MDA data sources	Query sophistication	Manual and limited to known ships	Multiple parameters (GT 5) for each query	Multiple parameters (GT 10) for each query.
	Access and disseminate data	Ability to security downgrade MDA information and pass to a Guard	Provide downgraded data to GUARD in a timely fashion	Guard technology limits quantity and quality of data downgrades, slows timeliness	Flexible guard data definitions and timely (within 2 hours) response	Increase timeliness to less than 1 hour
	Geospatial data sources	Accessibility of mapping data	Ability to overlay static MDA information on mapping data	Limited capability	Same as current capability	Automated overlays of MDA information on mapping data



# Section Title: I. Overview

A1857-J-12

- **Sub-Section Title: E. Solution Trade-off Analysis (STA), 1. Key Assumptions**
- **Guidelines:**
  - Content:
    - Describe key assumptions (economic life, period of comparison, links to other programs, technology assumptions, etc.)
    - Benefit / Cost Definitions (varies by USG. agency)

– Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	1 Paragraph



# Example: I. Overview

## E. STA. 1. Key Assumptions



- **Key Assumptions**

- Alternatives will be identified with the following assumptions:
  - They are systems of choice and are in common use today
  - They are currently on - or will be put on - the DCGS-A Baseline
  - Benefit / cost data will be identified and analyzed as consistently available across JCTD and Alternatives
- Upgrades required during FY '10 to FY '15 time period
- JCTD will be using RDT&E Funding
- Operations and Maintenance (O&M) funding required in post-JCTD timeframe
- This STA addresses FY '08 to FY '15 period
- Contractor is required to perform installations
- No additional hardware or supporting software is required

- **Benefit / Cost Definition by Targeted POR**

- DCGS-A determines benefits through both quantitative and qualitative measures
- Cost assessments include RDT&E, Procurement and O&M resourced by DCGS-A POR, FY09-12



# Section Title: I. Overview

A1857-J-13

- **Sub-Section Title: E. STA. 2. Alternatives Identification and Comparison**
- **Guidelines:**
  - Content: Identify status quo and alternative systems
    - Status Quo (i.e., the “do nothing” condition)
      - Provide operational capability description
    - Feasible Competitive Alternative systems (i.e., other capabilities, systems, tools, technologies or TTP)
      - Provide operational capability description
    - Provide comparative operational and technical descriptions [using matrix table] for how status quo and each alternative meets or exceeds Desired Capabilities and Top Level Capabilities and Metrics

– Format:

	PowerPoint	Word
Section Type	Bulleted List	Narrative
Section Length	Bullet, one to three sub-bullets as needed	One paragraph max per entry



# Example: I. Overview

## E. STA. 2. Alternatives Identification and Comparison

A1857-J-14

Desired Capability: Global, Persistent, 24/7/365 Maritime Cooperative and Non-Cooperative Vessel Awareness Information							
Task / Attribute Alternatives	Identify, Query and Filter Based on User Defined Criteria	Track Updates	Track Quality	Track Quantity	Advanced Queries	Access and Disseminate Data	Geospatial Data Sources
JCTD Candidate							
Status Quo							
Alternative #1							
Alternative #2							
Alternative #3							

- **Status Quo**
  - Description of status quo -
- **Feasible Competitive Alternatives**
  - Name of alternative capability, system, tool, technology, or TTP 1, PM, vendor
    - Descriptions
  - Name of alternative capability, system, tool, technology, or TTP 2, PM, vendor
    - Descriptions
  - Name of alternative capability, system, tool, technology, or TTP 3, PM, vendor
    - Descriptions





# Section Title: I. Overview



A1857-J-15

- **Sub-Section Title: E. STA. 3. Conclusions, and Recommendations**
- **Guidelines:**
  - Content: STA observations, conclusions, and recommendations, including:
    - Identifying recommended JCTD, Status Quo or Alternative
    - Provide conclusions and any additional observations to support recommendation

– Format:

	PowerPoint	Word
Section Type	Bulleted List	Narrative
Section Length	Bullet, Sub-Bullets As Needed	½ Page



# Example: I. Overview

## E. STA. 3. Conclusions and Recommendations



- **Recommendation**
  - Name of recommendation
- **Conclusions and Observations**
  - Conclusion 1
  - Conclusion 2
  - Observation 1
  - Observation 2
  - Conclusion / Observations n



# Section Title: I. Overview

A1857-J-16

- **Section Sub-Title: F. Capabilities Solution**

- **Guidelines:**

- Content:

- Identify:

- Key elements and components (e.g., sensors and processors, communications, systems, etc.)
      - Operational organizational components (e.g., local sites, national control centers, regional coordination centers, etc.)
      - Operational interoperability (e.g., external users (e.g., COCOMs, Services, DHS), international partners)

- Define:

- Operational and technical functionality / capabilities
      - Information and technologies usage and sharing (e.g., exportability, classification, etc.)

- Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	½ Page



# Example: I. Overview

## F. Capabilities Solution



- **Combined hardware and software system consisting of the following:**
  - Multi-INT Sensor Data and Databases [People, Vessel, Cargo, Infrastructure, 24/7, global basis]
    - Provides capability for data integration from multiple information sources [U.S. Navy, SEAWATCH, JMIE, Internet]
    - Enables access to unique SCI source data
  - Multi-INT Fusion Processing Software [auto correlation of SCI level data – illicit nominal/abnormal patterns]
    - Multi-INT data associations and linkages
    - Creates MDA multi-INT “SuperTracks”
    - Generates alarms/alerts on multi-INT data
  - Network and Security Services Infrastructure [scalable, equitable, interoperable, tailorable]
    - Leverage and use existing networks
    - Control / ensure appropriate access to/from JWICS, SIPRNet, NIPRNet
    - Publish information within an SCI SOA
    - Provides multilevel security info exchange – SBU, Secret, SCI
    - Enables continuous 24/7 information access
  - Maritime Ship Tracks – [automated ship activity detection, query/filter VOIs / NOAs]
    - Worldwide track generation service
    - Ship track alarms/alerts
  - Operational SCI User / UDOP [scalable / interoperable dissemination with interactive search for ops and analyst]
    - Provides enhanced multi-INT information track-related products for operators
    - Enables worldwide MDA SuperTrack coverage and observation
    - Display product on legacy [GALE] or other equipment
  - Archive / Storage [People, Vessel, Cargo, 24/7, global basis, infrastructure]
    - Maintain SuperTrack data archive for the life of the JCTD
    - Fused multi-INT knowledge products, short-term working archive
    - External database referencing and interfaces [i.e. mapping data...]
  - Alarms and Alert Tools [detection alerting ]
    - User definable controls for alarming, alerting and reporting
    - Capability to generate alerts on single anomalies or linked data/knowledge situations
  - CONOP and TTP
  - Standardized User Interface Symbology
  - Leverage CMA and VTP



# Section Title: I. Overview

A1857-J-17

- **Section Sub-Title: G. Overall Demonstration Strategy**

- **Guidelines:**

- Content:

- Describe top level framework for JCTD demonstrations:
      - Technical testing
      - Technical demonstrations
      - Operational demonstrations
    - Establish preliminary top level time frames (i.e., years / quarters), milestones and decision points
      - Driven by Desired Capabilities timelines
    - Establish top level approach for more detailed operational, technical and transition programmatic definition

- Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	½ Page



# Example: I. Overview

## G. Overall Demonstration Strategy



- **Enhanced integration and fusion of maritime data at the SCI level**
- **Ability to access data in a Web-based construct**
- **Ability to push data to lower classification enclaves**
- **Enhanced SA provided to analysts, joint warfighters and senior decision makers**
- **Two-Phase Spiral Technical and Operational Demonstrations, FY07-08**
  - Conduct technical component tests and demonstrations:
    - Reduces risk via test-fix-test approach and warfighter input
    - Performs final integration test and demonstration
    - Serves as “dress rehearsals” for operational demonstrations (OD)
    - Two TDs: August 2007 and April 2008
    - Performed in government and industry laboratories
  - Conduct operational demonstrations
    - Conducted by analysts, joint warfighters and senior decision makers
    - Serves to capture independent warfighter assessments and determine joint operational utility
    - OD-1 / LJOUA: October 2007 (VIGILANT SHIELD)
    - OD-2 / JOUA: June 2008 (standalone demo)
    - Performed at NMIC (USCG ICC and ONI), NORTHCOM JIOC, JFMCC North, NSA

**Enables Early /  
Incremental  
Transition to Warfighters  
pending JOUA**





# Section Title: II. Operational

A1857-J-18

- **Section Sub-Title: A. Operational View (OV-1)**

- **Guidelines:**

- Content: Operational concept graphic – top level illustration of JCTD use in operational environment:
  - Identify the operational elements / nodes and information exchanges required to conduct operational intelligence analysis
  - Serves to support development of the SV-1 architecture
  - Format as a high-level structured “cartoon like” picture
  - Illustratively describe the CONOP
  - Supports development of the CONOP and TTP

- Format:

	PowerPoint	Word
Section Type	Graphic	Graphic
Section Length	1 Slide	1 Page

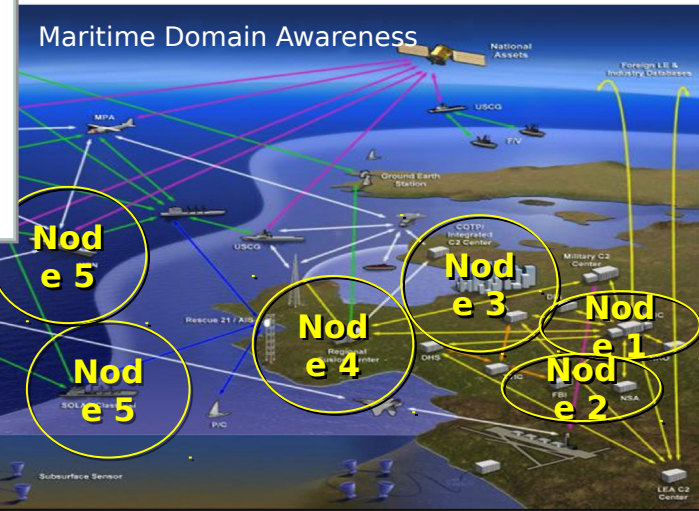
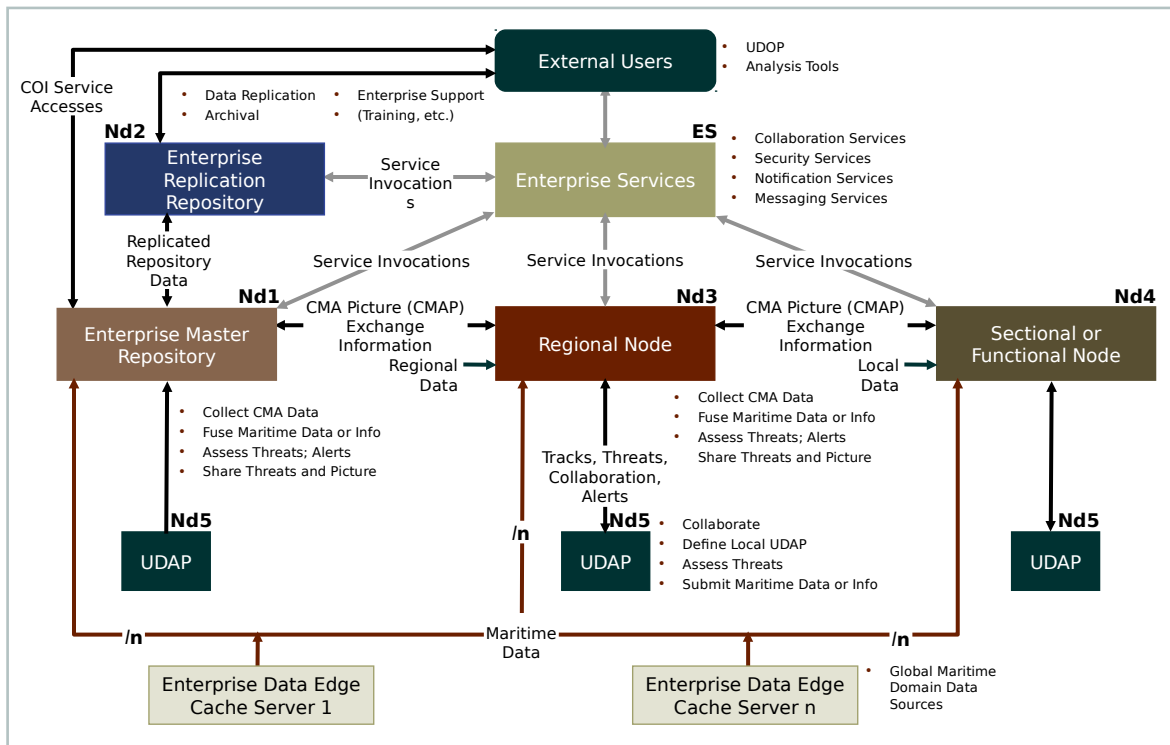


# Example: II. Operational

## A. Operational View-1 (OV-1)



A1857-J-19





# Section Title: II. Operational

A1857-J-20

- **Section Sub-Title: B. Top Level CONEMP or CONOP**

- **Guidelines:**

- Content:

- Describe Commander's intent in terms of overall operational picture within an operational area / plan by which a commander maps capabilities to effects, and effects to end state for a specific scenario:
      - Commander's written vision / theory that becomes fusion engine of means, ways and ends
      - Describe an approach to employment and operation of the capability in a joint and coalition environment
      - Not limited to a single system command, Service, or nation but can rely on other systems and organizations, as required

- Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	Page As Needed



## **Example: II. Operational B. Top Level CONEMP or CONOP**



**At the top level, the CONOP is based on the implementation of the JCTD among the NMIC and NORTHCOM. The JCTD hardware and software suites within the NMIC establish an improved information-sharing environment (ISE) based on SOA principles at the SCI level. The NMIC maintains the enhanced, integrated, fused maritime SCI information that it produces in a Web-based repository. Maritime analysts are thus able to access this information and perform threat analysis by conducting advanced queries of multiple data sources. Furthermore, the NMIC disseminates the fused data products to analysts at locations such as NORTHCOM at the SCI level. Fused data products are transmitted to lower classification enclaves, as shown in figure 2-2 based on end-user needs and capabilities. The shared, common operating picture (COP) is updated at the NMIC, then shared with mission partners.**

**When intelligence updates reveal increased threat indicators, NORTHCOM senior leadership directs its J-2 division to obtain detailed information regarding a known deployed threat vessel. The J-2 analysts, now armed with enhanced JCTD capabilities, are able to collaborate with other maritime partners to find and fix the target of interest from the JCTD multisource data, and conduct an assessment of the information. The target of interest and associated information is shared with mission partners with the regular updating of the COP. In turn, J-2 is able to provide NORTHCOM senior leadership with an accurate composite maritime picture inclusive of the threat data, and NORTHCOM in turn notifies partner agencies and support elements to take the appropriate actions.**



# Section Title: II. Operational

A1857-J-21

- **Section Sub-Title: C. Critical Operational Issues (COI)**
- **Guidelines:**
  - Content:
    - Define and establish the Critical Operational Issues (COI) for JCTD, and prioritize operational issues that characterize the ability of the JCTD to solve the Coalition / Joint / interagency Operational Problem
    - Describe what constitutes “improved mission performance” in terms of:
      - Usability (human operability), interoperability, reliability, maintainability, serviceability, supportability, transportability, mobility, training, disposability, availability, compatibility, wartime usage, rates, safety, habitability, manpower, logistics, logistics supportability, and / or natural environment effects and impacts

– Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	1 Page Maximum



## Example: II. Operational C. Critical Operational Issues



- **Usability (human operability):**

- Can the analyst / operator manipulate the fused SCI-generated data to set up the following?
  - User-defined operational picture
  - Automatic anomalous detection with associated alarms
  - Ability to access and transmit SCI maritime-related data

- **Surge Usage Rates:**

- Can the JCTD software process higher volumes of data during increases in OPSTEMPO?

- **Interoperability:**

- Can the JCTD suite process requests for data from multiple levels of security and between different agencies?

- **Operability:**

- Does the JCTD suite provide access to SuperTracks information, generated at the SCI level, over various networks via a services-oriented architecture dissemination process?





# Section Title: II. Operational

A1857-J-22

- **Section Sub-Title: D. Coalition / Joint / Interagency Operational Utility Assessment (OUA) Approach**
- **Guidelines:**
  - Content: Define top level operational utility assessment strategy for the JCTD overall, with emphasis on the operational demonstrations

– Format:

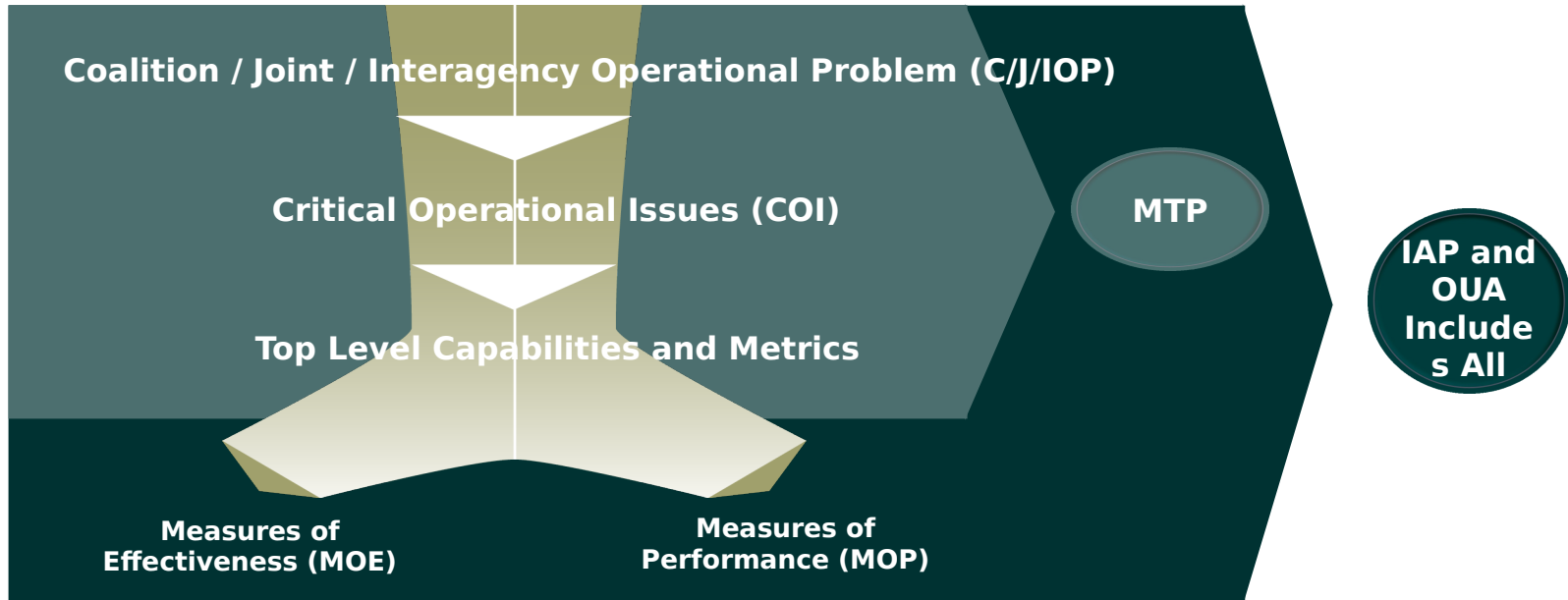
	PowerPoint	Word
Section Type	Graphic	Graphic
Section Length	1 Slide	½ Page



# Example: II. Operational D. Coalition / Joint / Interagency OUA Approach



A1857-J-23



**KEY:**

- Management and Transition Plan (MTP)
- Integrated Assessment Plan (IAP)
- Operational Utility Assessment (OUA)

**Qualitative and Quantitative Metrics Operationally Demonstrated Through CONOP / TTP**



# Section Title: II. Operational

A1857-J-24

- **Section Sub-Title: E. Operational Demonstration Approach**

- **Guidelines:**

- **Content:**

- Describe top level framework for operational demonstrations
      - Driven by Desired Capabilities
      - Defines purpose / function of each demonstration
      - Identifies number of demonstrations
    - Establish preliminary top level time frames (i.e., years / quarters), milestones and decision points
      - Driven by Desired Capabilities and Overall Demonstration Strategy timelines
      - Includes demonstration durations
    - Identify locations / ranges, etc...
    - Describe top level training of personnel and maintenance and sustainment of demonstration equipment
    - Identify demonstration participants
      - Warfighters / users
      - Independent assessor
      - Supporter

- **Format:**

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	½ Page



# Example: II. Operational

## E. Operational Demonstration Approach



- **Conduct Two Operational Demonstrations (OD) with JIM Operators / Responders**
  - Captures Operational utility assessments (OUA) and transition recommendations:
    - Interim JOUA (IJOUA), JOUA
    - Independent assessor supports operational manager
  - OD 1 (OD1) / IJOUA, 4<sup>th</sup> Qtr, FY08
    - Interim capability:
      - Participants: USG Interagency (SOUTHCOM, JFCOM, USACE, DoS, USAID, country team)
      - Demonstrate integrated JCTD methodology and limited tool suite using 90% pre-crises and 10% crisis vignettes
      - Conducted as part of Vigilant Shield Exercise
  - OD 2 / JOUA, 2nd Qtr, FY09
    - Full JCTD capability:
      - Participants: USG interagency (partner nation(s), SOUTHCOM, JFCOM, USACE, DoS, USAID, country team, Mission Director, IO/NGO)
      - Demonstrate integrated and semiautomated JCTD capability using 40% pre-crises, 40% crisis, and 20% post-crisis vignettes
- **Each OD is 2 weeks long, not including deployment, testing, installation, integration, and training**
- **Enables and facilitates a leave-behind interim operational capability, including hardware, software, and documentation**
- **Training of warfighters, maintenance and sustainment provided during JCTD**
- **Independent assessment performed by JHU / APL**



# Section Title: II. Operational

A1857-J-25

- **Section Sub-Title: F. Top Level Demonstration Scenarios**

- **Guidelines:**

- Content: Define operational scenarios to support development of JCTD CONOP and TTP
  - Provide “storyboard”-like description of potential operational situations / activities / exercises
  - Scoped to support conduct of operational demonstrations
  - Driven by Desired Capabilities, Top Level Capabilities and Metrics, CONOP and TTP

- Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	Page As Needed



# Example: II. Operational

## F. Top Level Demonstration Scenarios



### **Threat/Event Identification and Investigation: Collaborative Information/Intel Exchange**

- Intelligence information is immediately passed from the NMIC to the DHS Operations Center, CBP, USCG headquarters, Atlantic, and Pacific areas, USFFC, and to CCDRs: USNORTHCOM, USEUCOM, U.S. Africa Command (USAFRICOM), U.S. Central Command (USCENTCOM), U.S. Pacific Command (USPACOM), U.S. Southern Command (USSOUTHCOM), and all MHQs. Each CCDR passes the information to its respective Navy MHQ. Additionally, cognizant CCDRs begin to collaborate with defense Fleet MDA CONOP 55 forces in Canada, United Kingdom, Australia, and New Zealand. Diplomatic and intelligence organizations also collaborate on this possible threat.
- The USCG coordinates with Coast Guard and customs organizations within Canada, United Kingdom, Australia, and New Zealand.
- MHQs collaboratively coordinate and plan with multiple organizations and agencies and international partners. Commander, Sixth Fleet (C6F) begins collaborative planning with North Atlantic Treaty Organization (NATO) Component Command Maritime (CCMAR) Naples. National level assets and intelligence pathways are provided for the rapid detection and promulgation of information relating to vessels of interest (VOI). NMIC generates collection requests for NTM support.
- In the event the vessel is headed toward the U.S., the USCG National Vessel Movement Center checks all advance notices of arrivals to identify the pool of inbound vessels. The USCG coordinates with CBP National Targeting Center to identify cargo manifests on all inbound target vessels. NMIC gathers information on vessels' owners, operators, crews, and compliance histories; information is passed to all CCDRs for further dissemination.





# Section Title: III. Technical



A1857-J-26

- **Section Sub-Title: A. System View-1 (SV-1)**

- **Guidelines:**

- Content: Depict systems nodes and the systems resident at these nodes to support organizations/human roles represented by operational nodes, and identify the interfaces between systems and systems nodes.

- Format:

	PowerPoint	Word
Section Type	Graphic	Graphic
Section Length	1 Slide	1 Page Maximum

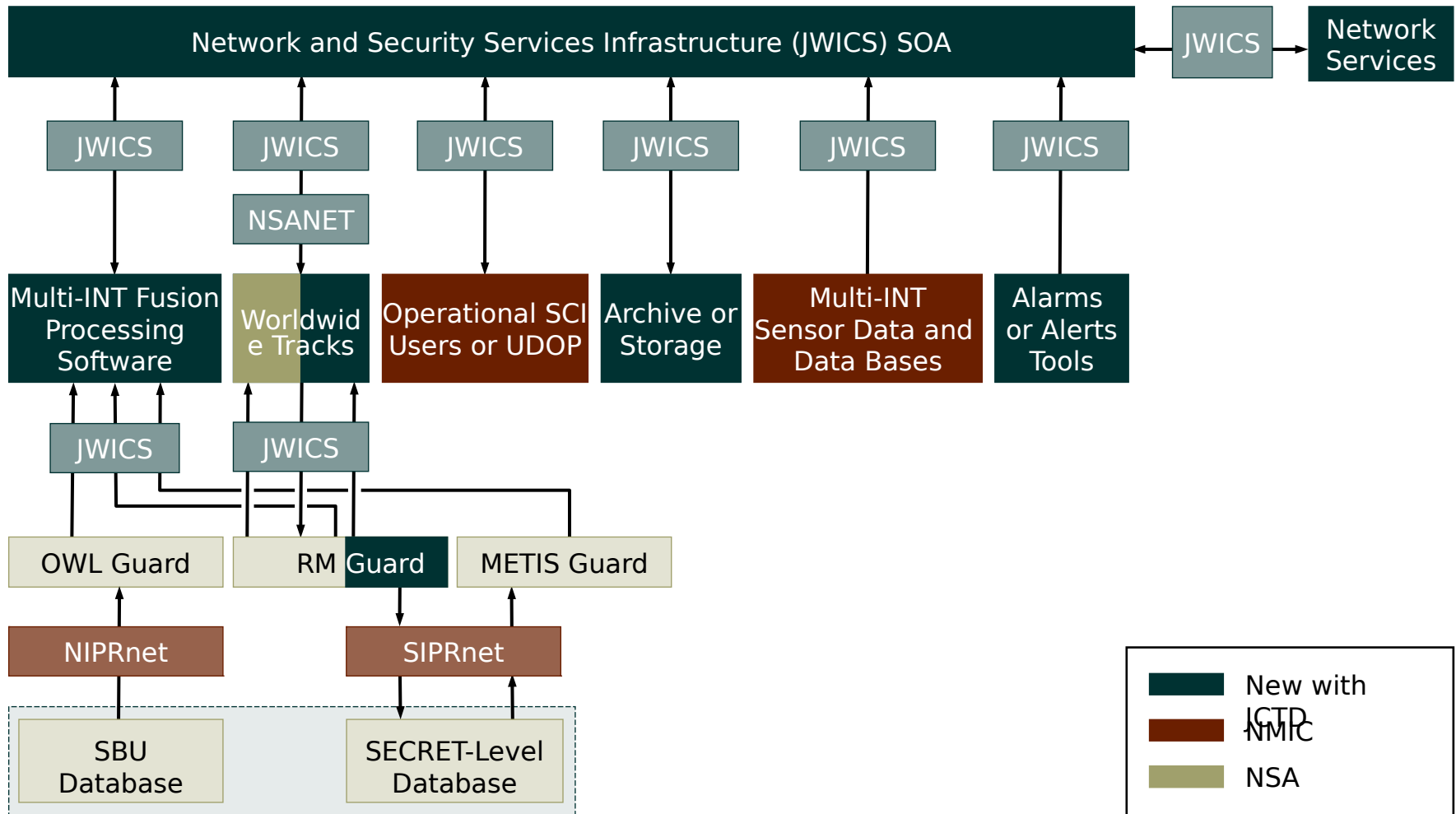


# Example: III. Overview

## A. System View-1 (SV-1)



A1857-J-27





# Section Title: III. Technical

A1857-J-28

- **Section Sub-Title: B. Technical Demonstration and Programmatic Approach**
- **Guidelines:**
  - Content:
    - Describe framework for technical testing, approach and demonstrations
      - Driven by Desired Capabilities, OV-1, Capabilities Solution
      - Defines purpose / function of each task, test and demonstration
      - Identifies number of technical builds, tests, demonstrations
    - Establish preliminary time frames and suspenses (i.e., years / quarters / months); milestones and decision points:
      - Driven by Desired Capabilities, Overall Demonstrations Strategy and operational demonstration strategy timelines
      - Includes demonstration durations
    - Identify locations, labs, etc.
    - Describe top level training of personnel and maintenance and sustainment of demonstration equipment
    - Identify demo

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1-2 Slides	Page As Needed*

- Format:

\*Could be developed in Gantt chart format



# Example: III. Technical

## B. Technical Demonstration and Programmatic Approach

- Define JIM decision maker, planner, responder requirements (Nov-Dec 07)
- Conduct site surveys (i.e., data sources, equipment, tools, facilities, etc.) (Nov-Dec 07)
- Determine initial JIM information flow requirements including IATO (Dec 07)
- Establish operational and system architectures version 1.0 (Jan-Mar 08)
- Determine JIM net-centric enterprise services compliance and locations (Jan-Feb 08)
- Identify and define software interfaces for user-supplied data (Dec-Jan 08)
- Establish configuration management processes (Dec-Jan 08)
- Develop software specification and documentation (Jan-Jul 08)
- Initiate development of technical test plan (Jan 08)
- Initiate development of training package (Jan 08)
- Develop JIM methodology version 1.0 (Jan-Apr 08)
- Establish test plan version 1.0 (Mar 08)
- Build and test software version 1.0 (Apr-May 08)
- Build and test software version 1.1 (Jun-Jul 08)
- Develop operational and system architectures 1.1 (Jul 08)
- TD1 in USG laboratories (Aug 08)
- Develop JIM methodology version 1.1 (Aug 08)
- Obtain IATO from CDR, ERDC (Aug 08)
- Deliver training package (Sep 08)
- Perform software fixes version 1.2 (Sep 08)
- Conduct training (Oct 08)
- Conduct OD1 (Nov 08)



# Section Title: III. Technical



A1857-J-29

- **Section Sub-Title: C. Core Technologies**

- **Guidelines:**

- Content:

- Identify key and core technologies for successful technical and operational demonstration of the Capabilities Solution
    - Provide Technical Readiness Level (TRL) for each:
      - Baseline at start of JCTD
      - Projection at completion of last operational demonstration

- Format:

	PowerPoint	Word
Section Type	Narrative	Bullets
Section Length	Table	



# Example: III. Technical C. Core Technologies



A1857-J-30

Technology	Pre-JCTD	FY09
Architecture and Software		
Web-GIS Compatible Tools	8	9
JIM Knowledge Management Module	6	7
Integrated Common Operational Picture	7	7
Integrated Software Tool Suite	4-6	7
NECC-Like Architecture	5	8
Communications and Networking		
IP, Web-Based, Commercially Secure Network	9	9
DIT Support Module		
Database Management Tools	7	9
Language Management Tools	5	7
Web-GIS Compatible Tools	8	9



# Section Title: III. Technical

A1857-J-31

- **Section Sub-Title: D. Affordability for Transition**

- **Guidelines:**

- Content:

- Describe methodology, approaches, techniques for addressing affordability of CONOP, Capabilities Solution and training:
      - Focus on post-JCTD time frame in support of transition strategy
        - Extended Use of Interim Capability
        - Follow-on Development, Production, Fielding and Sustainment

- Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	½ Page





# Example: III. Technical D. Affordability for Transition



- **Hardware:**

- Maximize installed core and network computing, communications systems and displays ---NCES, GCCS, DCGS
  - Leverage installed SCI network nodes
- Leverage enterprise efforts [i.e., DISA horizontal fusion project]—SOA efforts
  - Leverage installed NCES / CMA SOA
- No change to any legacy interface—no new standards
  - Leverage customer displays

- **Software:**

- Commercially available software
- Controlled development production process
- Leverage proven products



# Section Title: III. Technical

A1857-J-32

- **Section Sub-Title: E. Interoperability and Integration**

- **Guidelines:**

- Content:

- Describe how the JCTD will integrate and interoperate with existing systems at target PORs / Programs / Operations:
      - Address integration issues (i.e., how will system integrate at operational target PORs / Programs / Operations):
        - Identify applicable government standards, specifications, etc.
        - Define how JCTD will comply with existing and/or evolving standards, specifications, etc.
        - Define how JCTD will integrate within existing and/or evolving system architecture(s)
    - Define interoperability issues (i.e., how the JCTD will operate within an existing and/or evolving operational architecture [i.e., OV-1])
      - Describe approach for interoperability with existing and/or evolving organizational CONOP / TTP
    - Define coordination with JFCOM and other appropriate organizations (NSA, DISA, etc.)

- Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	½ Page



# Example: III. Technical

## E. Interoperability and Integration



- **Technical approach**

- AOA / tech assessment
- Services oriented architecture – leverage CMA services as much as possible
- Maximize COTS hardware and software
- Leverage installed data processing systems
- Minimum impact to legacy interfaces / standards [GALE and DCGS]
- Minimize change to communications systems or networks
- DoDIIS and NCES compliance
- Navy and NMIC: enterprise SOA standards
- NRO/NSA: OTH Gold
- NORTHCOM JIOC: JWICS compliance
- JFMCC: JWICS compliance
- USCG HQ/ICC: JWICS compliance
- Maritime Information Interchange Model (MIEM) compliance
- Publish to IBS service standard format
- Internal to JCTD:
  - SQL, PKI Certs., CMA, NGA GDS, browser-enabled applications, GALE
  - Custom database interfaces as required by data providers
  - SFS/ NTIPS

- **CONOP integration**

- Enhancement to current TTP/CONOP [national/Navy/USCG]
- New functionality implemented within legacy user interface capabilities

- **Activity coordination required**

- Data exchange – interoperability validation (at the user interface only)
- Operational approval – local data authority
- Data access / operational use - DoD and IC partners (MOA/rqmt)
- Ensure compliance with JFCOM guidance



# Section Title: III. Technical

A1857-J-33

- **Section Sub-Title: F. Training**

- **Guidelines:**

- Content:

- Describe methodology, approaches, techniques for planning and conducting training:
      - Operational training for demonstrations, TTP, and scenarios
      - Technical training for demonstrations
        - Components, devices, software, etc.
        - Architectures
        - Greater connectivity beyond JCTD core solution
      - Identify relationship to existing training plans and documents
      - Identify who prepares training materials and who conducts training
      - Identify who needs to be trained

- Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	½ Page



# Example: III. Technical F. Training



- **Approach for conducting training:**
  - CONOP and TTP Define Training
  - User Jury - Provides input to Training Plan [TM conducts]
    - Conducted at NRL
  - Training Focused on Conducting ODs
  - Will Address Both Technical and Operational Needs
    - Help from Users Needed on Operational Side
  - Conducted at User Sites (see OV-4 ovals)
  - Training Plan Content:
    - User Manuals
    - Curriculum and Instructional Materials
    - Equipment Definition
    - Staffing (JCTD Team Members)
    - Compatible With Existing Site Training Standards
    - User Prerequisites
- **Relationship to existing training plans and documents**
  - Deliver training to User Organization [NORTHCOM, NRO/NSA, NMIC, JFMCC North]
- **Preparation of training materials**
  - TM develops and conducts initial training
- **Trainees:**
  - System Administrators, Network Administrators and DBAs
  - Intel Analysts
  - Operations Specialists



# Section Title: III. Technical

A1857-J-34

- **Section Sub-Title: G. Security, Information Assurance and Safety**

- **Guidelines:**

- Content: Outline security, certification and accreditation, and safety procedures relevant to government agency, organization, etc.
  - Describe methodology, approaches, techniques for addressing security, information assurance and safety required to operate at specified classification levels, and technical and operating environments:
    - Identify applicable government standards, specifications, etc.
    - Identify software components, devices, software, etc.
    - Identify needed security and safety documentation to be developed during the JCTD
  - Define classification levels
    - Identify related / pertinent approved classification guidelines, regulations, etc.
    - Identify POC for preparing security and information assurance materials
  - Review and reference applicable standards and specifications including ICD 503, DCID 6-3; DITSCAP; DIACAP and other applicable standards
  - Define types of security and / or safety releases (e.g., IATO, IATT) to be obtained and from what organization
  - Identify POC to obtain security and C&A

- Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	Page As Needed



# Example: III. Technical

## G. Security, Information Assurance and Safety



- **Operates at the SCI security level**
- **Interface with JWICS, SIPRNet (via Guard), NIPRNet (via Guard) networks**
- **Users may access JCTD-derived services from within SCI enclave**
  - JCTD data available to Secret users via a security guard
- **Need to establish a critical path for guard approval process at ONI**
- **Interim Authority to Operate (IATO) the Demo:**
  - Obtain approval 2 months prior to each OD (August 1, 2007 for OD1)
    - Scanner results are an input to the approval process
  - NMIC: SV-1, SSAA (incl. risk mitigation plan), security scanners (for ports), infrastructure CCB, ISSM, IATO needed, mobile code complicates approvals
  - NORTHCOM: same as NMIC, DAA, network bandwidth consumption, CCB 2 months prior to OD, interim approval to connect (IATC) needed to open firewall
  - MAST: IATO, coordinate with NSA S14F2 to facilitate, obtain necessary safety releases
  - JFMCC North: same as NORTHCOM
  - Guard approval / certification for information beyond tracks, ODNi
    - 2 weeks to 2 years
    - Must be completed before site approval
- **Includes a security management plan**
  - Mission assurance category definition
- **Leverage CMA security and information assurance management**
- **Data tagging (if implemented)**
  - Products for dissemination only
  - Report-level tagging
  - Will comply with CAPCO standards
- **No safety release is required as the system is software based, only**





# Section Title: IV. Transition

A1857-J-35

- **Section Sub-Title: A. Overall Transition Strategy**

- **Guidelines:**

- Content:

- Define top level overall transition strategy, recommendations, and way forward for JCTD:
      - Driven by Desired Capabilities, CONOP, Capabilities Solution
      - Identify primary / major potential transition paths:
        - Extended Use of Interim Capability
        - Follow-on Development, Production, Fielding and Sustainment for targeted POR / Programs
    - Establish preliminary top level time frames (i.e., years)
      - Driven by overall demonstration and OUA strategy completion timelines

- Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	½ Page Maximum

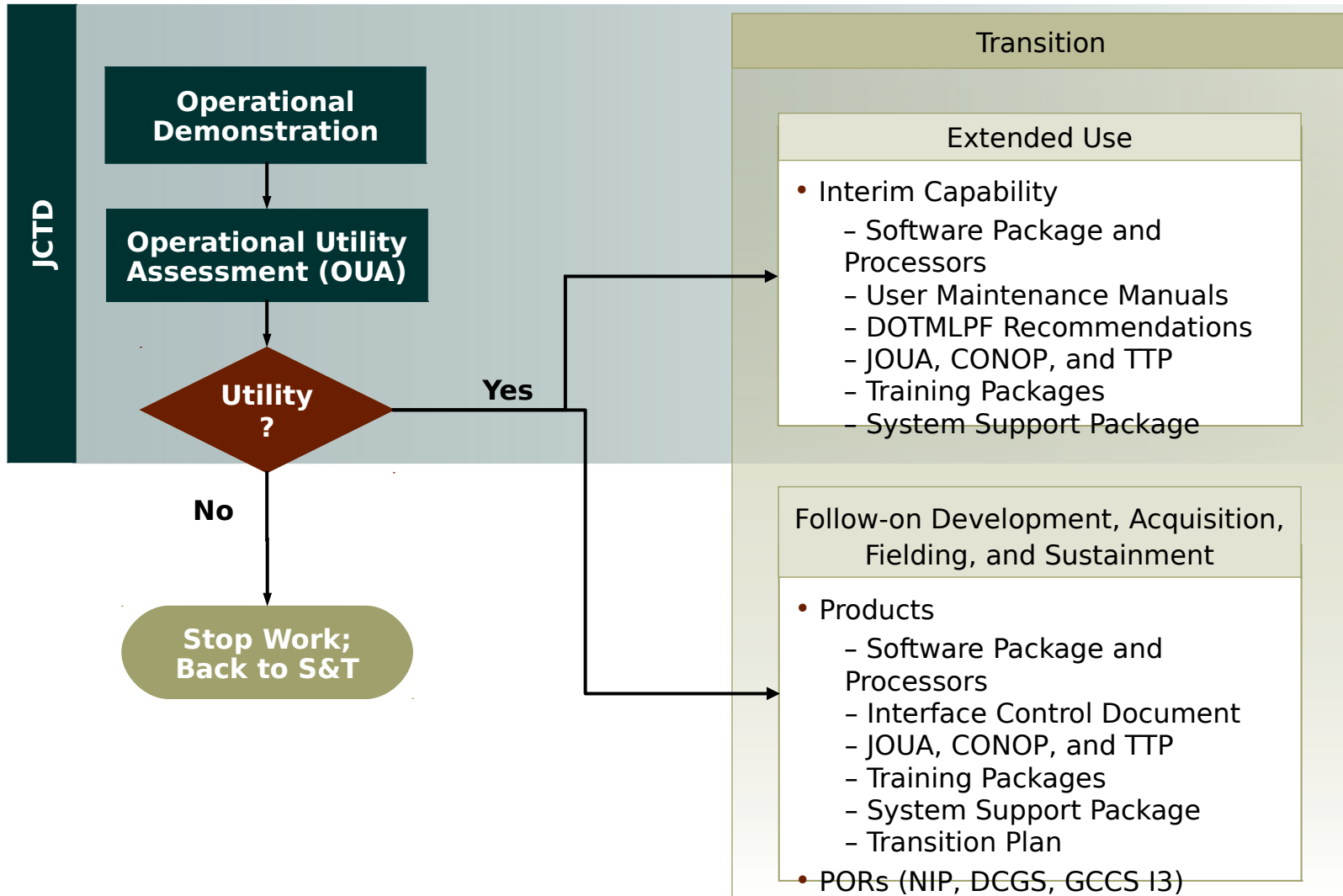


# Example: IV. Transition

## A. Overall Transition Strategy



A1857-J-36





# Section Title: IV. Transition

A1857-J-37

- **Section Sub-Title: B. Description of Products / Deliverables**
- **Guidelines:**
  - Content:
    - Describe all JCTD transition deliverables
    - Identify deliverables title(s) (i.e., software, documentation or hardware) and quantities
    - Deliverables should be compatible with operational and / or acquisition needs
    - Identify responsible JCTD manager
  - Format:
    - Identify top level transition paths

	PowerPoint	Word
Section Type	Bulleted List	
Section Length	Based on Number of Deliverables	



# Example: IV. Transition

## B. Description of Products / Deliverables



A1857-J-38

Deliverable / Product	Quantity	TM	XM	OM	EU	ACQ
<b>Hardware</b>						
Servers, storage and associated cables, racks, etc.	2 sets	x			x	
Guards	TBD					
<b>Software</b>						
Integrated software system (decision aids, database management, etc.)	2 sets	x			x	x
GOTS Alarm Generation Software	2 sets	x			x	x
Archiving	2 sets	x			x	x
Multi-Int Fusion Software	2 sets	x			x	x
User Interface Software	2 sets	x			x	x
Tracking Component	2 sets	x			x	x
Oracle DBMS / J 2EE / Enterprise Service Components	2 sets	x			x	x
<b>Documentation</b>						
CONOP	1			x	x	x
Training Plan	1	x				x
Training Package (1 master document with an annex per site)	5 (1 per site)	x			x	x
LMUA Report	1			x	x	x
Final J OUA Report	1			x	x	x
Interface Control Document (ICD)	1	x				x
Software Specification	1	x				x
Requirements Specification (SRS)	1	x				x
Capability Development Document (CDD)	1		x			x
Security Management Plan	1	x			x	x
Management and Transition Plan	1	x	x	x		
Test Plan	1	x				
Architectures	1	x				x
TTP	5 (1 per site)			x	x	x
DOTMLPF and Policy Recommendations/Changes	1			x	x	x

**Supporting narrative descriptions for each product / deliverable provided in MTP**



# Section Title: IV. Transition

A1857-J-39

- **Section Sub-Title: C. Follow-on Development, Production, Fielding, Sustainment, 1. Overall Strategy**
- **Guidelines:**
  - Content:
    - Describe overall strategy to prepare for acquisition, operationally test and evaluate, acquire, field and sustain post-JCTD capability [as applicable]
    - Driven by Desired Capabilities, CONOP, Capabilities Solution
    - Identify targeted PEO / PM organizations
    - Describe coordination with combat developer(s) and Extended Use communities
    - Define OM and TM roles
    - Establish preliminary top level time frames for follow-on development, production, fielding and sustainment (month, year)
      - Driven by overall demonstration and OUA strategy completion timelines

– Format:

	PowerPoint	Word
Section Type	Bulleted List	Narrative
Section Length	1-2 Charts	Page As Needed



# **Example: IV. Transition**

## **C. Follow-on Development / Production / Fielding / Sustainment 1. Overall Strategy**

- **Products and deliverables transitioned to acquisition PMs in FY09 pending successful OUA in FY08 and resource sponsor commitment:**
  - Could start in FY08 pending IOUA results and resource sponsor commitment
  - Targeted PMs and Programs of Record (POR) / Programs
    - PMs / POR: National Intelligence Programs (NIP), DCGS, GCCS-I3
- **Follow-on development requires (~12 months):**
  - Production design
  - Certification and Accreditation
  - Operational Test and Evaluation
- **Production and fielding starts in FY10:**
  - Low Rate Initial Production (LRIP) and sustainment, FY10
  - Full Rate Production and sustainment, starting in FY11
- **Equipment should be COTS/GOTS to the greatest extent possible**
- **Competitive RFP and contract(s)**
- **Fleet Forces Command (FFC), Director of National Intelligence (DNI), Office of Naval Intelligence (ONI) primary capability developers for CDD**
- **TM and OM will provide feedback from EU, if conducted**



# Section Title: IV. Transition

A1857-J-40

- **Section Sub-Title: D. Interim Capability through Extended Use (EU), 1. Overall Strategy**
- **Guidelines:**
  - Content: Define overall strategy for Extended Use (EU) of Interim Capability at each operational organization, specifically:
    - Driven by Desired Capabilities, CONOP, Capabilities Solution
    - Identify targeted operational organizations
    - Describe coordination with Combat Developer(s) and EU organizations
    - Define OM and TM roles
    - Establish preliminary top level timeframes (month, year)
      - Driven by Overall Demonstration and OUA Strategy completion timelines

– Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Chart	Page As Needed





# Example: IV. Transition

## D. Interim Capability thru EU 1. Overall Strategy

- **Conducted with operational components at demonstration sites in FY10**
  - Pending IJOUA; could start in 2nd qtr., FY09
  - 21 months maximum
- **Includes hardware, software, and documentation (see Products / Deliverables)**
  - Could be “Go-to-Pre-Crisis, Crisis and Post-Crisis” capability
- **Finalizes CONOP, TTP, training package, and DOTMLPF recommendations**
- **Qualitative decision maker, planner, responder feedback [not required] iterated with:**
  - JFCOM, DoS, host nations, combat development centers and schoolhouses
  - Program managers and special project offices
- **TM provides technical support [as needed]**
- **Requires positive IJOUA**
- **Requires operational / combat developer and PM commitment for post-demonstration time frame**
- **Does not enhance capability or continue assessments**
- **Details defined in Section IV, Transition Management of the Management and Transition Plan**



# Example: V. Networks / Equipment / Facilities / Ranges / Sites



A1857-J-41

- **Guidelines:**

- Content: Identify required networks / equipment / facilities / ranges / sites required to conduct operational, technical and Extended Use activities / tasks
  - Build on Deliverables / Products Excel spreadsheet
  - Provide quantities, date required and POC for each

- Format:

	PowerPoint	Word
Section Type	Table	Table
Section Length	1 Slide	1 Page



# Example: V. Networks / Equipment / Facilities / Ranges / Sites



A1857-J-42

Networks / Equipment / Facilities / Ranges / Sites	Quantities	Date Required	POC
Servers	4		
Workstations	12		
Network/Internet	20		
Printers	9		
Land-line Communications	9		
Knowledge Wall Display	9		
Scanners w/ML OCR	6		
Laptops	8		
I -7 FRB, SC	1		
I SIC, I FCOM I -9	1		
DoS Facility	1		
DISA Lab	1		
ITL, Vicksburg, MS	1		
CERL, Champaign, IL	1		
TEC, Fort Belvoir	1		
Honduras COPECO OPS Center	1		
FAHUM Host Nation	1		
US Embassy, Honduras	1		



# Section Title: VI. Organizational and Programmatic Approach



A1857-J-43

- **Section Sub-Title: A. Organizational Structure, Roles and Responsibilities**
- **Guidelines:**
  - Content: Identify management areas and structure including:
    - Oversight Group (OG), Integrated Management Team (IMT), operational, technical, transition, oversight, supporting functions
    - Define top level functions for each management area and working arrangements between management areas
    - Information is illustrated through organization chart and supporting narrative for each management area

– Format:

	PowerPoint	Word
Section Type	Org Chart	Org Chart and Narrative
Section Length	1 Slide	Page As Needed

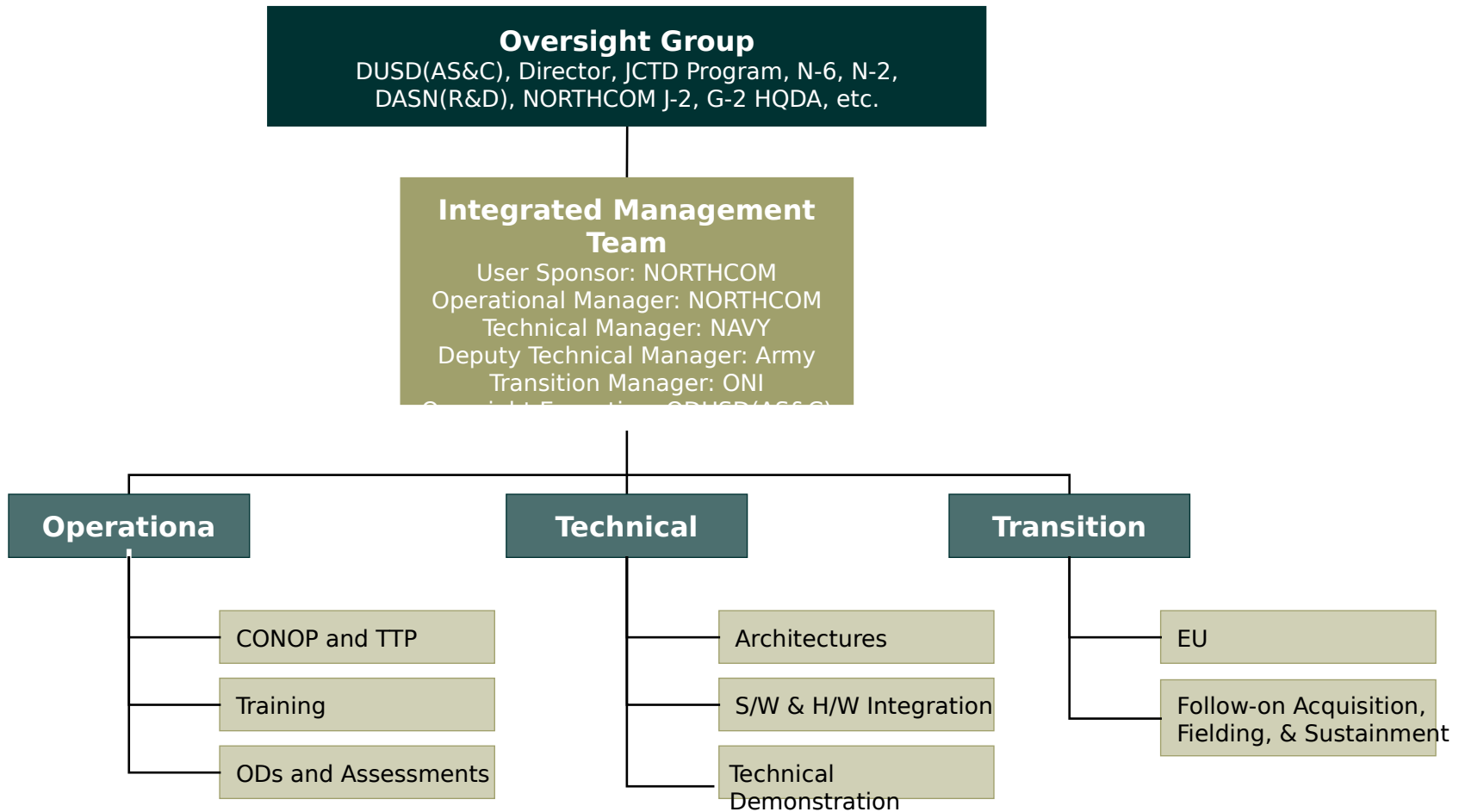


# Example: VI. Organizational and Programmatic Approach

## A. Organizational Structure, Roles and Responsibilities



A1857-J-44



Supporting narrative descriptions for each management area provided in Proposal Paper



# Section Title: VI. Organizational and Programmatic Approach



A1857-J-45

- **Section Sub-Title: B. Programmatic, 1. Schedule**
- **Guidelines:**
  - Content: Identify major operational, technical, transition and programmatic tasks for JCTD
    - Uses Gantt chart illustration
    - Capture “pre”, implementation and post-JCTD time frames and key decision points
    - Define applicable budget and POM time frames

– Format:

	PowerPoint	Word
Section Type	Gantt Chart	
Section Length	1 Slide	

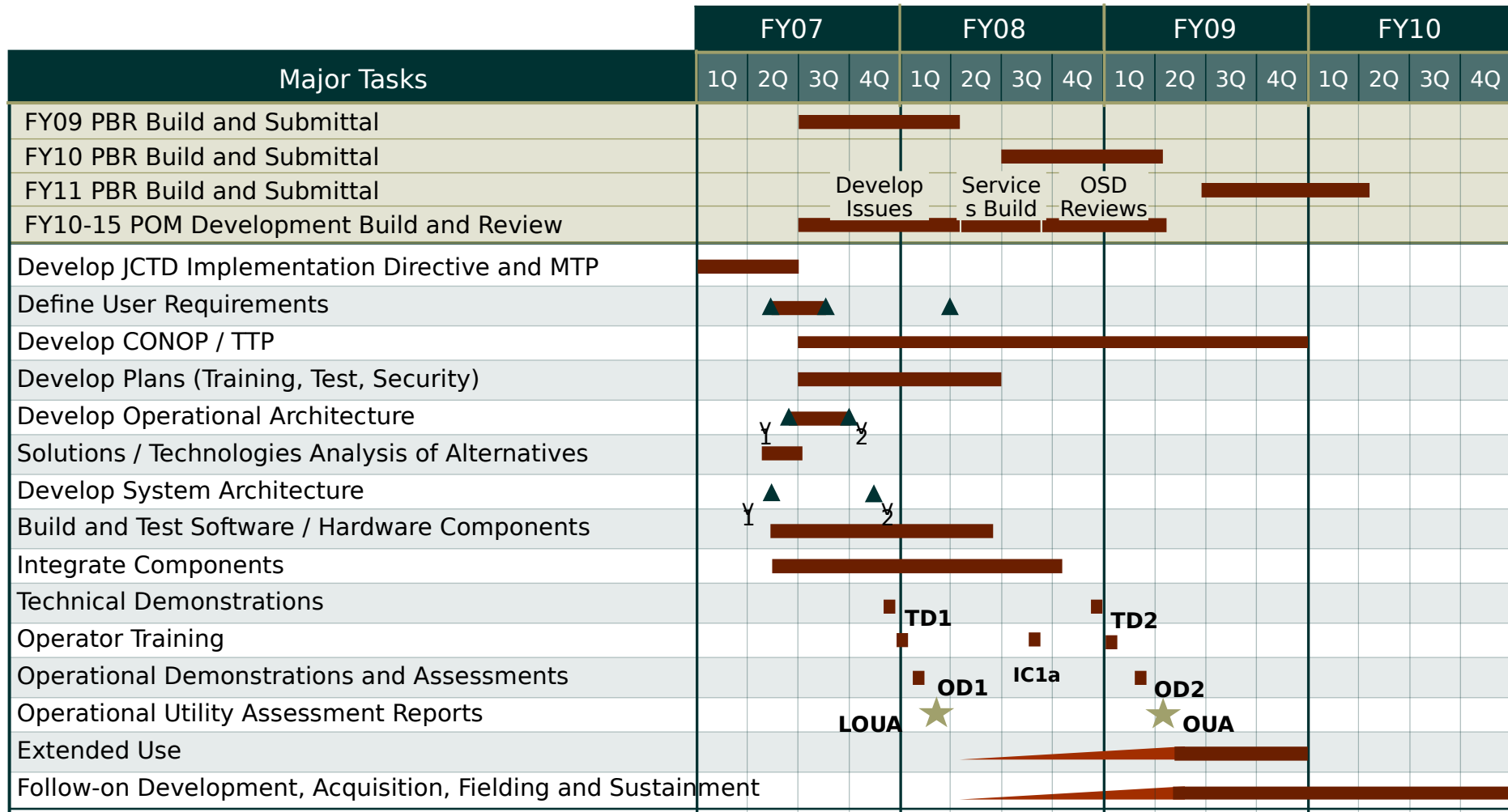


# Example: VI. Organizational and Programmatic Approach

## B. Programmatic, 1. Schedule



A1857-J-46







# Section Title: VI. Organizational and Programmatic Approach



A1857-J-51

- **Section Sub-Title: B. Programmatic, 2. Supporting Programs**
- **Guidelines:**
  - Content: Identify programs contributing to JCTD implementation
    - Describe top level components / systems being leveraged by JCTD
    - Identify program name and POC
    - Identify specific level of funding JCTD plans on leveraging (i.e., DinK)
    - Identify time frame (i.e., years, etc.) when components / systems are required by JCTD

- Format:

	PowerPoint	Word
Section Type	Excel Spreadsheet	
Section Length	1 Slide	Page As Needed



# Example: VI. Organizational and Programmatic Approach

## B. Programmatic, 2. Supporting Programs



A1857-J-52

Supporting Program	POC	Supporting Components / Systems	Date Required	DinK Funding (\$000)	
				FY08	FY09
<b>MPICE</b>		Trend Analysis and Predictive Software	1 an 08 - 1 un 09		
<b>USAID Best Practices</b>		Methodology	1 an 08 - 1 un 09		
<b>USAID SCALE</b>		Methodology	1 an 08 - 1 un 09		
<b>Other Methodologies</b>			1 an 08 - 1 un 09		
<b>NECC</b>		Architecture, Standards, Specifications, Interoperability Requirements	1 an 08 - 1 un 09		
<b>DARPA IRC</b>		Interagency Decision-Making Software	1 an 08 - 1 un 09		
<b>DARPA ICEWS</b>		Trend Analysis and Predictive Software	1 an 08 - 1 un 09		
<b>Senturion</b>		Trend Analysis and Predictive Software	1 an 08 - 1 un 09		
<b>PREACT</b>		Geospatial Software	1 an 08 - 1 un 09		



# Section Title: VI. Organizational and Programmatic Approach



A1857-J-47

- **Section Sub-Title: B. Programmatic, 3. Cost Plan**

- **Guidelines:**

- Content: Identify major operational, technical and transition tasks and funding per year for JCTD:
  - Capture implementation years for JCTD funding
  - Illustrate in (\$thousands)
  - Identify Basis for Estimates (BOE) methodology term for cost, and insert in block at the top of the spreadsheet table. Multiple methods may be used.
    - Analogy: Subjectively compares the JCTD cost items with one or more existing similar items / systems / capabilities for which there is accurate cost and technical data.
    - Parametric: “This pattern holds” known as the statistical method, this technique generates an estimate based on JCTD cost item performance or design characteristics using elements from similar items / systems / capabilities. It differs from analogy in that it uses multiple systems and makes statistical inferences about the cost estimating relationships.
    - 3. Build-Up: A “bottom-up” method of cost analysis that is the most detailed of all the techniques and the most costly to implement. Each element must be costed to build the cost estimate for the entire JCTD.
    - Expert Opinion: The other methods are not available.

- Format:

	PowerPoint	Word
Section Type	Excel Spreadsheet	
Section Length	1 Slide / Table	



# Example: VI. Organizational and Programmatic Approach

## B. Programmatic, 3. Cost Plan



A1857-J-48

2009 Candidate Review Board				
XYZ JCTD Functional Cost Estimation (\$ Thousands)				
Task / Item	FY09	FY10	FY11	TOTAL
<b>Basis of Estimate: (see Cost Plan Guidelines)</b>				
<b>Operational</b>				
Concept of Operations (CONOPS) / Tactics, Techniques, Procedures (TTPs)				\$0
Demonstrations and Assessments				\$0
Training				\$0
Travel				\$0
Joint / Operational Utility Assessment / OUA Reports				\$0
<b>Operational Total Estimate</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>
<b>Technical</b>				
Site surveys and trade off analysis				\$0
Architecture and integration software systems				\$0
Technical Tests and Demos				\$0
Harbors / Ports Facilities computers, servers, displays				\$0
National Operations Center computers, servers & displays, switches, modems				\$0
Regional Coordination Center computers, servers, displays, switches, modems				\$0
UPS / back-up power sources/power conditioners				\$0
Communications hardware (TBD), including SATCOM terminals				\$0
Coastal radar suites				\$0
AIS systems				\$0
EO/IR sensor suites				\$0
Cell Phones				\$0
Binoculars				\$0
UHF/VHF Radios				\$0
Towers (AIS, radars and comms)				\$0
Training Package				\$0
Travel				\$0
Technical Documentation				\$0
<b>Technical Total Estimate</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>
<b>Transition</b>				
Interim Capability Sustainment (discuss with OE on BA4 transition funding)				\$0
Transition Planning				\$0
Travel				\$0
<b>Transition Total Estimate</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>
<b>Estimated Total Cost</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>

*These itemized lines are examples only. Please tailor the lines to justify the estimated costs for your JCTD broken down in the three major areas: Operational, Technical and Transition.*

*Each line could be further broken down into subareas (e.g. manpower and materials) if desired at the OE's discretion, however, is not necessary at the Candidate Review Board.*



# Section Title: VI. Organizational and Programmatic Approach



A1857-J-193

- **Section Sub-Title: B. Programmatic, 4. Funding**
- **Guidelines:**
  - Content: Identify major funding and sources per year for JCTD
    - Identify organizational funding sponsors, program element and project numbers
    - Identify Direct and Dedicated In-Kind funding
    - Indicate Committed, Uncommitted or TBD funding status for each funding source
    - Capture implementation years for JCTD funding
    - Illustrate in (\$thousands)
    - Funding Risk (i.e., Green, Yellow, Red) will automatically react to funding data entries
  - **NOTE:**
    - Use care when entering data in cells / fields. Select cells / fields have embedded formulas
    - Above funding term definitions are provided in second embedded template sheet when DUSD(AS&C) Example template is activated using Excel

– Format:

	PowerPoint	Word
Section Type	DUSD(AS&C) Template	
Section Length	Line Entries As Needed	



# Example: VI. Organizational and Programmatic Approach

## B. Programmatic 4. Funding



A1857-J-194

Oversight Executive

01-Feb-08

### FY09-12 AS&C I CTD Funding Template

(For use in presenting FY-09 I CTD Candidate funding fair-share profiles)

Funding Risk: Green

I CTD Title - Example						Yellow \$\$ cells are formula driven.				
						(Dollars in Thousands)				
Organization	(Note 1) Commitment	Type of Funding	<sup>2</sup> Funding Description	<sup>3</sup> Program Element (PE)	Project #	FY-09	FY-10	FY-11	FY-12	Total
USN	Committed	RDT&E/6.3	Cash	0602123N	N/A	\$ 2,000	\$ 2,000	\$ 1,000	\$ -	\$ 5,000
USA	TBD	TBD	Cash	N/A	N/A	\$ -	\$ -	\$ -	\$ -	\$ -
USAF	Committed	RDT&E/6.3	Cash	0603401F	5021	\$ 1,000	\$ 1,000	\$ 2,000	\$ -	\$ 4,000
SOCOM	TBD	TBD	Cash			\$ -	\$ -	\$ -	\$ -	\$ -
DISA	TBD	TBD	Cash			\$ 500	\$ 500	\$ -	\$ -	\$ 1,000
DTRA	Committed	RDT&E/6.3	Cash	0602715BR	BF	\$ 1,000	\$ 1,000	\$ 2,000	\$ -	\$ 4,000
USMC	TBD	TBD	Cash			\$ -	\$ -	\$ -	\$ -	\$ -
DISA	Uncommitted	TBD	Cash			\$ -	\$ 1,000	\$ 1,000	\$ -	\$ 2,000
NIMA	Committed	RDT&E/6.3	Cash	0305102BO	TBD	\$ 6,500	\$ 6,500	\$ -	\$ -	\$ 13,000
Total Service & Defense Agency (committed)						\$ 10,500	\$ 10,500	\$ 5,000	\$ -	\$ 26,000
DUSD (AS&C)	TBD	RDT&E/6.3	Cash	0603648D8Z	648	\$ 4,000	\$ 4,000	\$ 2,000	\$ -	\$ 10,000
Total Cash Committed Funding:						\$ 14,500	\$ 14,500	\$ 7,000	\$ -	\$ 36,000
Stated I CTD Cash Requirement						\$ 15,000	\$ 16,000	\$ 8,000	\$ -	\$ 39,000
Delta to Cash Requirement						\$ (500)	\$ (1,500)	\$ (1,000)	\$ -	\$ (3,000)
Service/Agency Committed:		\$26,000								
Percent Cash Committed		92%				AS&C Percent Total: Cash Only				28%
Funding Risk (Cash):		Green				AS&C Percent Cash:				28%

### Dink Section

Organization	(Note 1) Commitment	Type of Funding	<sup>2</sup> Funding Description	<sup>3</sup> Program Element (PE)	Project #	FY-09	FY-10	FY-11	FY-12	Total
USAF	Committed	TBD	Dink			\$ 5,000	\$ 3,000	\$ -	\$ -	\$ 8,000
USN	Uncommitted	TBD	Dink			\$ -	\$ 2,000	\$ -	\$ -	\$ 2,000
USA	TBD	TBD	Dink			\$ -	\$ -	\$ -	\$ -	\$ -
USMC	TBD	TBD	Dink			\$ -	\$ -	\$ -	\$ -	\$ -
Total Cash & Dink Committed Funding:						\$ 19,500	\$ 19,500	\$ 7,000	\$ -	\$ 46,000
Stated I CTD Cash & Dink Requirement						\$ 20,000	\$ 21,000	\$ 8,000	\$ -	\$ 49,000
Delta to Cash & Dink Requirement						\$ (500)	\$ (1,500)	\$ (1,000)	\$ -	\$ (3,000)



# Section Title: VII. Acquisition and Contracting Strategy



A1857-J-53

- **Guidelines:**

- Content: Top level approach for acquiring JCTD products and services including:
  - Contracts, OTAs, DinK, MOU / MOA, etc.

- Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	½ Page





# Example: VII. Acquisition and Contracting Strategy



- **Competitive RFP will be issued for development of MDA software**
- **MOA will be established between TM and VTP program for use of MDA databases during conduct of JCTD**
- **SETA contract # xxx.xx.xx will be employed and funding added to provided two additional engineers**
- **A MIPR for \$750K will be sent to JTAA to provide operational utility assessment planning, documentation and assessor support for operational demonstrations**
- **GOTS servers, workstations and laptops will be provided at no cost to JCTD**



# Section Title: VIII. JCTD Risk Management and Mitigation Approach



A1857-J-54

- **Guidelines:**

- Content: Identify risks associated with conducting JCTD, specifically:
  - Define short description of each risk, expected level of impact (high, medium, low), mitigation strategy for risk factors, expected result of mitigation strategy:
    - Operational (e.g., Is the operational warfighter available? etc.)
    - Technical (e.g., Can technical challenges be overcome? Is the JCTD mature enough?)
    - Funding (e.g., Is there adequate government funding for JCTD activities? How secure is the funding? What's the level of funding? etc.)
    - Cost (e.g., how much does the JCTD cost?)
    - Schedule (e.g., Is the schedule for the JCTD executable within approved ID time frame?)
    - Policy (e.g., What policies are impacting transition of capability to POR / Program / Operation?)
    - Transition (e.g., Is the JCTD compatible with POR / Program / Operational system architectures? What is the probability of this JCTD transitioning to POR / Program / Operation?)

- Format:

	PowerPoint	Word
Section Type	Bulleted Table	
Section Length	1-2 Slides	Page As Needed



# Example: VIII. JCTD Risk Management and Mitigation Approach



Risk Factors [JCTD]		Level of Impact	Mitigation Strategy	Expected Result
Operational	▪ Operational users availability	Medium	▪ Establish MOU between JCTD OM and Brigade; Maintain open dialogue on users status	▪ Users trained and available for OD1 and OD 2
	▪ Participation in Joint Exercise UFL 09. Status of MOU	Low	▪ None required	▪ N/A
Technical	▪ Airship materials life cycle vulnerable to ultraviolet rays at 60K altitude	Medium	▪ Conduct 6-8 month technical development effort to increase strength and life cycle characteristics	▪ Life cycle of materials increased from months to years at 60K altitude
Funding	▪ JCTD not fully funded by Defense Agency XXXX	High	▪ Brief Director, Defense Agency XXXX to obtain approval and funding commitment	▪ JCTD fully funded by signing of ID
Cost	▪ Cost of propulsion system unaffordable by post-JCTD PM	Low-Medium	▪ Let BAA to seek additional known suppliers and alternative systems	▪ Propulsion system cost reduced by 28% at completion of OD2 with no requirement to re-demonstrate during JCTD
Schedule	▪ Lead time for training of operational users. Technical Demonstration (TD) 1 conducted within 30 days of OD 1	Low	▪ Initiate preliminary training of users prior to TD1. Conduct short refresher training between TD 1 and OD1.	▪ Operational users fully trained and ready for OD1
Policy	▪ No ASD(C3I) policy established for adopting NATO ontology standards	Medium	▪ Develop, coordinate and obtain approval of ASD(C3I) policy statement	▪ ASD(C3I) policy established by the end of final OD
Transition	▪ Airship materials, Propulsion system and ASD(C3I) policy	Medium-High	▪ Implement and closely track Technical, Cost and Policy mitigation strategies. Brief and coordinate transition risks to DUSD(AS&C), key POR decision-makers, and ASD(C3I) to obtain guidance and support	▪ Senior leadership guidance and support is obtained to ensure JCTD maintains full funding and approved status, and transition is funded and immediately implemented following OD2 pending satisfactory OUA



# Section Title: IX. Summary and Payoffs

A1857-J-56

- **Guidelines:**

- Content: Summarize JCTD payoffs

- Format:

	PowerPoint	Word
Section Type	Bullet List	Narrative
Section Length	1 Slide	½ Page



## Example: IX. Summary and Payoffs

- **Supports GWOT by providing COCOMs and other USG agencies with maritime traffic, cargo and people information not otherwise available**
- **Enhanced regional security and stability that supports the U.S. National Strategy for Maritime Security:**
  - Reduction of the ungoverned maritime environment that fosters criminal and terrorist activities and movements
  - Enables maritime security operations for critical assets by providing basic maritime awareness
- **Precedent-setting solution to Joint, Coalition and interagency problem:**
  - Use of DoD and DHS expertise
  - Comparatively small front-end DoD investment for major interagency payoff
- **Transition direct to new MDA POR for follow-on acquisition**
- **Addressing more than traditional warfighting gaps—proactively addressing emerging national security problem through interagency and coalition cooperation strategy**
- **Fully compatible with national and USN MDA CONOP and plans**



# Section Title: X. Acronyms and Terms

A1857-J-57

- **Guidelines:**

- Content: Identify acronyms and spell out terms

- Format:

	PowerPoint	Word
Section Type	Bullet List	
Section Length	Line Entries As Needed	



# Example: X. Acronyms and Terms



- **DISA: Defense Information Systems Agency**
- **DoDI 5000.2: DoD Instruction 5000.2**
- **CJCSI 3170.01: Chairman, Joint Chiefs of Staff, CJCSM 3170.01**





# Section Title: XI. Glossary

A1857-J-58

- **Guidelines:**

- Content: Include key terminology and brief definitions as appropriate

- Format:

	PowerPoint	Word
Section Type	Bullet List	
Section Length	Line Entries As Needed	



## Example: XI. Glossary

- **Data:** A representation of individual facts, concepts or instructions in a manner suitable for communication, interpretation or processing by humans or by automatic means. (IEEE 610.12)
- **Information:** The refinement of data through known conventions and context for purposes of imparting knowledge.
- **Operational Node:** A node that performs a role or mission. (DoDAF)



# Section Title: XII. Related Documents

A1857-J-59

- **Guidelines:**

- Content: Include key references as appropriate

- Format:

	PowerPoint	Word
Section Type	Bullet List	
Section Length	Line Entries As Needed	



## Example: XII. Related Documents

- **DISA, 2002: Defense Information Systems Agency, Joint Technical Architecture, Version 4.0, July 17, 2002.**
- **DoDI 5000.2: DoD Instruction 5000.2, Operation of the Defense Acquisition System, May 12, 2003.**
- **CJCSI 3170.01 Chairman, Joint Chiefs of Staff, CJCSM 3170.01, Joint Capabilities Integration and Development System (JCIDS), June 24, 2003.**